

SERPENTINE

RANGE SITE DESCRIPTION

PE 31-44

Land Resource Area _____

Location _____

Date 4/5/73 _____

1. TOPOGRAPHY AND ELEVATION: This site occupies low ridges in a rolling landscape. Slopes range from 3 to 10 percent. Small micro depressions form micro valleys within the rolling landscape. Elevation varies from 1200 to 1400 feet.
2. SOILS:
 - a. These soils have brownish, noncalcareous, crumbly clay loam or clay surfaces over serpentine rock. It is high in magnesium; however, the magnesium may not be readily available to plants. Low water holding capacity and moderate fertility limit the site's production. Plant roots are seldom found below 19 inches. 50 - 70% of the surface is covered with serpentine rock. Tilted serpentine ridges occur frequently.
 - b. Some taxonomic units which characterize this site are:

Renick clay loam
Renick clay
 - c. Specific site location: _____
3. CLIMAX VEGETATION:
 - a. The climax plant community consists predominately of mid grasses with an understory of short grasses such as hairy grama and curlymesquite. Occasional individual and/or mottly liveoak trees occur on the site but contribute little to the total annual yield.

RELATIVE PERCENTAGE

Grasses	90%	Woody	5%	Forbs	5%
Little bluestem	25	Yucca		Plantain	
Sideoats grama	15	Catclaw	5	Bluebonnet	5
Indiangrass	5	Liveoak		Bush sunflower	
Cane bluestem	10			Orange zexmenia	
Plains lovegrass	5	Cactus spp.	T	Annual forbs	T
Fall witchgrass	10				
Texas wintergrass	10				
Curlymesquite	10				
Hairy grama					

- b. When retrogression is cattle induced, annual forbs such as antelope horn, pepperweed, vetch, evax, oxalis and bladderpod increase. Short grasses such as hairy grama and curlymesquite also increase. Woody plants such as cedar and agrito increase in pockets of deeper soil.
- c. Approximate total annual yield of the site in excellent condition may vary from 700 pounds in below average years to 2500 pounds in above average years.

WILDLIFE NATIVE TO THE SITE:

The site is used by deer, turkey, quail, rabbits and dove.

5. ESTHETIC AND RELATED VALUES: Colorful forbs decorate the landscape from early spring through mid summer. Texas bluebonnet is frequently formed on the site. The site has an open aspect in climax as well as in a deteriorated condition due to the absence of tree and bush type vegetation.
6. HYDROLOGIC CHARACTERISTICS: The rolling to slightly rough topography in combination with moderate to slowly permeable soils and serpentine rock outcrops cause rapid runoff from the site. However, in climax condition plant cover and tilted serpentine rock outcrops greatly reduce erosion potential, thus causing the site to yield runoff which is relatively free of sediment.
7. GUIDE TO INITIAL STOCKING RATE:

Condition Class	Climax Vegetation	Ac/AU Yearlong
Excellent	76 - 100	20 - 25
Good	51 - 75	22 - 28
Fair	26 - 50	25 - 32
Poor	0 - 25	35+

RELATIVE FORAGE QUALITY OF SPECIES ^{1/}

A. Cattle

<u>Primary</u>	<u>Secondary</u>	<u>Low Value</u>
Little bluestem	Hairy grama	Catclaw
Indiangrass	Curlymesquite	Yucca
Sideoats grama	Fall witchgrass	Liveoak
Plains lovegrass		Plantain
Cane bluestem		Bluebonnet
Texas wintergrass		
Bush sunflower		
Orange zexmenia		

B. Sheep

<u>Primary</u>	<u>Secondary</u>	<u>Low Value</u>
Bush sunflower	Little bluestem	Yucca
Orange zexmenia	Hairy grama	Cactus spp.
Curlymesquite	Indiangrass	
Texas wintergrass	Bluebonnet	
Sideoats grama	Catclaw	
Plains lovegrass		
Fall witchgrass		
Liveoak		
Annual forbs		

C. Goats and Deer

<u>Primary</u>	<u>Secondary</u>	<u>Low Value</u>
Liveoak	Fall witchgrass	Cactus spp.
Bush sunflower	Curlymesquite	Yucca
Orange zexmenia	Texas wintergrass	Cane bluestem
Annual forbs	Plains lovegrass	Indiangrass
Bluebonnet		Little bluestem

D. Quail and Dove

<u>Primary</u>	<u>Secondary</u>	<u>Low Value</u>
Annual weed seeds	Fuzzy seeded grass seed	Grass foliage
Sideoats grama seed	Oak (acorns)	
Indiangrass seed		

E. Turkey

<u>Primary</u>	<u>Secondary</u>	<u>Low Value</u>
Tender grass & forbs	Coarse grass	Woody plant foliage
Acorns (oak)		
Forb seed		
Oak mast		

^{1/}See legend on separate page for definitions of interpretations made for each animal.